

Periodic Research

A Study on the Impact of Information Technology on Employment



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Abstract

This study explores whether there is any significant relationship between Information Technology and employment creation. The major objective of my research work is to know the impact of Information Technology on employment. The minor objectives of primary data based research is to find out the impact of IT through congenial working environment at working place of employees, impact of IT over feminisation of employment, impact of BPOs in employment, impact of IT on wealth creation, impact of IT over employment in other sectors, impact of IT on organisations of Lucknow, impact of IT on rural areas associated to Lucknow and impact of IT over social interactions among employee.

Study of primary data reveals that there exists a significant relationship between Information Technology (IT) and congenial environment of organisations, feminisation of employment, quick employment, wealth creation through employment generation, employment generation in allied sectors. Also there is a significant relationship between IT & organisations of Lucknow, employment in rural areas associated with Lucknow and social networking of employees.

Hence I conclude that an important reason for the increase in employment in recent times is due to revolution in Information Technology.

Keywords: Information Technology, Employment, Feminisation, BPO, Social Networking of Employees.

Introduction

The roadmap to build India's large scientific workforce was prepared by the then Prime Minister, Mr Jawaharlal Nehru and the then Union Education Minister, Mr Maulana Abdul Kalam Azad. Mr Azad built IITs modelled after the Massachusetts Institute of Technology. It is their vision that India today produces nearly 1 million engineers every year. The IT sector found a pioneering stalwart in Dr Vikram Sarabhai. Among others, his legendary foresight was one of the early catalysts for the growth of IT in India.

Information Technology (IT), a knowledge-based industry, has the tremendous potential of becoming an engine of employment generation, productivity improvement for all sectors of the economy and means of efficient governance. It enhances access to information, protects consumers, provides access to government services, makes skill formation and training more effective, improves delivery health services, and promotes transparency. It provides tremendous employment potential and linkages between government and the people both at the rural and urban level.

The employment potential in IT and ITES is substantial and the gestation period is lesser than in other sectors of the IT industry. It is highly quality-oriented, human –resource intensive and requires consistent performance with high standards. Therefore, the success of ITES will mainly depend on the quality of manpower and infrastructure. Knowledge based skill-oriented training is the key to quality of manpower. ITES to succeed requires top-class infrastructure with adequate bandwidth, fault-free and continuous power with two layers of redundancy to avoid any breakdown.

Till three decades ago, Indian Economy was considered as a rural and agriculture based economy. It was a distant dream at that time to think that India would move from the agro-based economy to a world class knowledge based economy.

The ratio of an industry's output to the Gross Domestic Product (GDP) of a country is an important indicator of the impact of that industry on the country's economy. The immense contribution of the sector has also made a major impact on the country's employment generation and contribution to exchequer. Besides contributing to the country's growth

through direct channels, it has also played a key role in employment generation of other sector including real estate, telecom, and retail sector, by creating demand for the output generated by these sectors.

The rural population in UTTAR PRADESH constitutes 65 per cent of the State's population. Being predominantly an agricultural state, the quality of life and the health of its economy is largely driven by the performance of the rural sector. Information technology provides new opportunities to tackle problems related to rural poverty, health, illiteracy, unemployment and environmental degradation etc. IT applications can be effectively used for management and monitoring of environment resources, pollution warning systems, environmental emergency management systems for floods, forest fires and other natural disasters.

Objective of the Study

Major Objectives

To know the impact of IT on employment.

Minor Objectives

1. Impact of IT has led to Quick employment generation.
2. Impact of IT has led to employment opportunities in other sectors.
3. Impact of IT has led to social networking of employees.
4. Impact of IT has led to employment generation in rural areas associated to Lucknow.
5. Impact of IT has led to feminization of employment.

Review of Literature

Computer Policy 1984

The Computer Policy announced by the Government of India in 1984 recognised software as an industry for the first time in India. Govt simplified the process of obtaining clearances and permits, and eased the tariff structures and exports restrictions encouraging the development of the IT industry.

Computer Policy 1986

This policy on computer software exports and software development and training gave a much needed fillip to the software industry.

Liberalisation of India's Economy (1990)

Liberalisation of India's economy in the early 1990s, has not only led to rapid growth but also helped a great deal towards maximisation of consumer benefits which is evident from a huge fall in tariffs.

Economic Reforms (1990)

Efforts were made to attract foreign & domestic investment. Foreign companies were permitted to establish fully owned subsidiaries in the electronic exports processing zones. Within the Ministry of Finance there was greater recognition of India's comparative advantage in the sector, as it rationalised entry barriers for foreign companies, made available fast, low-cost data connection facilities, and reduced and rationalised duties, taxes, and tariffs.

The Ministry of Information Technology (1990)

is meant to act as a nodal institution for the promotion of IT sector, facilitating and coordinating the various initiatives of the central and state governments and the private sector.

Dr. Richard Heeks (1996)

Reveals that liberalization has brought in only limited benefits, and argues that a successful software industry requires essential state interventions of a promotional nature.

Sustaining Economic Development (2003)

By Sushant Mahapatra India's English-speaking labour pool with a strong quantitative aptitude provided an early advantage in learning and reproducing programming languages that are written in English.

India and the Knowledge Economy (2005)

A report World Bank Institute studies, India's telecom and information infrastructure development has registered rapid growth in recent years. More than 55 million people had mobile phones at the end of 2010. Indian mobile telephony has become one of the cheapest in the world.

Evolution of India's Telecom Policy (2008)

By Ramesh Subramaniam, according to this study more than 700 million Indians live in rural areas and far flung villages do not have telecommunication services.

Hypotheses

Hypothesis 1

H1

There is insignificant relationship between Information Technology and quick employment. (Q1 will prove this hypothesis)

H0

There is a significant relationship between Information Technology and quick employment.

Hypothesis 2

H1

There is insignificant relationship between Information Technology and employment opportunities in other sectors. (Q2 will prove this hypothesis)

H0

There is a significant relationship between Information Technology and employment opportunities in other sectors.

Hypothesis 3

H1

There is insignificant relationship between Information Technology and social networking of employees. (Q3 will prove this hypothesis)

H0

There is a significant relationship between Information Technology and social networking of employees.

Hypothesis 4

H1

There is insignificant relationship between Information Technology and employment in rural areas associated with Lucknow. (Q4 will prove this hypothesis)

H0

There is a significant relationship between Information Technology and employment in rural areas associated with Lucknow.

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Hypothesis 5

H1

There is insignificant relationship between Information Technology and feminisation of employment. (Q5 will prove this hypothesis)

H0

There is a significant relationship between Information Technology and feminization of employment.

Research Design

Data

This study is purely based on one of the classification of data that is primary data.

Tools of Primary Data: Questionnaire

Scale: Lickert Scale

Data Analysis

SPSS is a widely used program for statistical analysis in social sciences. SPSS is used to achieve deeper understanding of people's attitude, preferences and behaviour so that this valuable insight can be included in decision making. SPSS clearly shows the significance of your findings.

Test: Pearson's Chi – Square Test of SPSS

Sample Size: 200 IT officials

Sample Profile

The Sample Profile is IT Professionals (180) and IT Academician (20).

Sampling Unit

The sampling unit of my research work is IT employees and IT academician.

Factors Identification for Primary Data

1. Quick Employment generation.
2. Employment opportunities in other sector.
3. Social networking of employees.
4. Employment generation in rural areas associated with Lucknow.
5. Feminization of Employment.

Findings

Q1 - BPO Offers Quick Employment to Fresh Graduates

	Observed N	Expected N	Residual
SA	94	66.6	27.4
A	176	66.6	109.4
CS	36	66.6	-30.6
D	12	66.6	-54.6
SD	15	66.6	-51.6
Total	333		

Interpretation

94 respondents strongly agree, 176 respondents agree, 36 respondents can't say, 12 respondents disagree and 15 respondents strongly disagree.

Test Statistics for Question 1

BPO Offers Quick Employment to Fresh Graduates	
Chi-Square	289.778 ^a
Df	4
Asymp. Sig.	.000

a. 0 cells (0.0%) have expected frequencies less than 5. The minimum expected cell frequency is 66.6.

Asymp Significance (.000) < Significance Level (.05)

When Asymp. Significance is less than .05 then NULL HYPOTHESIS (H6) is **rejected**. And ALTERNATE HYPOTHESIS (H0) is **accepted**.

This means that there is a significant relationship between Information Technology and quick employment.

Q 2 - IT Professionals Increased Employment In Other Sectors

	Observed N	Expected N	Residual
SA	99	66.6	32.4
A	164	66.6	97.4
CS	30	66.6	-36.6
D	20	66.6	-46.6
SD	20	66.6	-46.6
Total	333		

Interpretation

99 respondents strongly agree, 164 respondents agree, 30 respondents can't say, 20 respondents disagree and 20 respondents strongly disagree.

Test Statistics for Q. 2

IT Professionals Increased Employment Opportunity In Other Sectors	
Chi-Square	243.532 ^a
Df	4
Asymp. Sig.	.000

a. 0 cells (0.0%) have expected frequencies less than 5. The minimum expected cell frequency is 66.6.

Asymp Significance (.000) < Significance Level (.05)

When Asymp. Significance is less than .05 then NULL HYPOTHESIS (H6) is **rejected**. And ALTERNATE HYPOTHESIS (H0) is **accepted**.

This means there is a significant relationship between Information Technology and employment opportunities in other sectors.

Q 3 - IT Led to Interpersonal & Social Interactions Among Employees.

	Observed N	Expected N	Residual
SA	96	66.0	30.0
A	170	66.0	104.0
CS	39	66.0	-27.0
D	20	66.0	-46.0
SD	5	66.0	-61.0
Total	330		

Interpretation

96 respondents strongly agree, 170 respondents agree, 39 respondents can't say, 20 respondents disagree and 5 respondents strongly disagree.

Test Statistics for Q 3

IT Led To Interpersonal & Social Interactions Among Employees	
Chi-Square	277.000 ^a
Df	4
Asymp. Sig.	.000

a. 0 cells (0.0%) have expected frequencies less than 5. The minimum expected cell frequency is 66.0.

Asymp Significance (.000) < Significance Level (.05)

When Asymp. Significance is less than .05 then NULL HYPOTHESIS (H6) is **rejected**. And ALTERNATE HYPOTHESIS (H0) is **accepted**.

This means that there is significant relationship between Information Technology and social networking of employees.

Q.4 - Boom of Employment in IT Industry is Increasing in Rural Areas Associated to LKO

	Observed N	Expected N	Residual
SA	100	64.8	35.2
A	168	64.8	103.2
CS	30	64.8	-34.8
D	16	64.8	-48.8
SD	10	64.8	-54.8
Total	324		

Interpretation

100 respondents strongly agree, 168 respondents agree, 30 respondents can't say, 16 respondents disagree and 10 respondents strongly disagree.

Test Statistics for Q 4

Boom of Employment in IT Industry Is Increasing In Rural Areas	
Chi-Square	285.259 ^a
Df	4
Asymp. Sig.	.000

a. 0 cells (0.0%) have expected frequencies less than 5. The minimum expected cell frequency is 64.8.

Asymp Significance (.000) < Significance Level (.05)

When Asymp. Significance is less than .05 then NULL HYPOTHESIS (H6) is **rejected**. And ALTERNATE HYPOTHESIS (H0) is **accepted**.

This means that there is significant relationship between Information Technology and employment in rural areas associated to Lucknow.

Q.5- IT Companies are Country's Biggest Employer of Women

	Observed N	Expected N	Residual
SA	90	67.8	22.2
A	182	67.8	114.2
CS	36	67.8	-31.8
D	16	67.8	-51.8
SD	15	67.8	-52.8
Total	339		

Interpretation

90 respondents strongly agree, 182 respondents agree, 36 respondents can't say, 16 respondents disagree and only 15 respondents strongly disagree.

Test Statistics for Q.5

IT Companies are Country's Biggest Employer of Women	
Chi-Square	295.233 ^a
Df	4
Asymp. Sig.	.000

a. 0 cells (0.0%) have expected frequencies less than 5. The minimum expected cell frequency is 67.8.

Asymp Significance (.000) <Level of Significance (.05)

When Asymp Significance is less than .05 than Null Hypothesis (H2) is **rejected**. And Alternate Hypothesis (H0) is **accepted**.

This means that there is significant relationship between Information Technology and feminisation of employment.

Overall Findings

1. There is a significant relationship between Information Technology (IT) and Quick employment.
2. There is significant relationship between Information Technology (IT) & other sectors.
3. There is significant relationship between Information Technology (IT) and social networking of employees.
4. There is significant relationship between Information Technology (IT) and employment in rural areas associated with Lucknow.
5. There is significant relationship between Information Technology (IT) and feminisation of employment.

Conclusions

The IT

Enabled Services and BPO sectors are a popular choice for the young generation and offer numerous quick employment opportunities for graduates from various backgrounds. Graduates from any discipline with an aptitude for communication and interacting with people are eligible for IT sector employment.

Due to advent of IT, there are around 10 million jobs created in other sectors such as Transport, Banking, Railways, Airways, Defence, Telecom, Power sector, Construction, Facility management, IT transportation, Catering and other services.

Information Technology and computer networks have made working employees together possible at a distance too. Social networking is helpful to both job seekers and employers; they can begin by starting something that's related to your career interest. Your blog could also help showcase your skills and track you job search.

The employment has been generated due to advent of IT in rural areas associated with Lucknow. The rural population in Uttar Pradesh constitutes 65 per cent of the State's population. Being predominantly an agricultural state, the quality of life and the health of its economy is largely driven by the performance of the rural sector.

Feminisation of employment is usually an urban phenomenon. It is noted that regular employment increased substantially among urban females only. It is true that the widely prevalent preference for regular jobs serves as a powerful motivation for many high school and college going urban girls.

Suggestions

India should

1. Impart English education in rural areas.
2. Develop telecommunication infrastructure in rural areas since it is an important tool for socio-economic development of the society.

3. Increase budgetary allocation in higher education in the field of IT sector.
4. Recognize female talent in the field of IT.
5. Take various steps to promote establishment of IT companies in Private sector.

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